

BRIEFER ARTICLES.

Description of a new fossil species of *Chara*.—In a former volume of this journal¹ I described, under the name of *Chara compressa*, a *Chara* fruit from the Wasatch group or lower Tertiary rocks of Wales, Utah. That species was well characterized by being longitudinally much depressed, the height being at least one fifth less than the width. The apex was obtuse or even slightly depressed and the number of spirals, as observed in side view, ten. This was the first North American species founded upon the 'fruits,' and I am now able to add a second equally well characterized species.

Chara Stantonii, n. sp. (Fig. 1, 2, 3).—Fruit (sporostegium) oblong-elliptical in general outline, slightly smaller at apex, obtuse, nearly one fifth longer than wide (0.63^{mm} long, 0.48^{mm} in diameter); number of spirals as observed in side view eight or nine; cells furrowed, separated by thin, low projecting ridges.

This species was obtained by Mr. T. W. Stanton of the United States Geological Survey, for whom I take pleasure in naming it, from the west side of Smith's Fork of the Bear River, about 20 miles north of Cookville, Wyoming, in a locality that is of great geological interest. The horizon is the Bear River formation, which was long known as the Bear River Laramie, but which Mr. Stanton has shown² to belong to the lower part of the upper Cretaceous. The 'fruits' are scattered in considerable numbers throughout certain layers of the section, in a matrix of hard fine-grained bluish shaly limestone. They are associated with large numbers of fresh-water shells, among them *Pyrgulifera humerosa* Meek, *Corbula pyriformis* Meek, *Unio vetustus* Meek, *Limnæa nitidula* Meek, *L. haldemani* White and *Neritina naticiformis* White. The 'fruits' and shells are all perfectly silicified and were liberated from the matrix by dissolving the limestone in acid.



CHARA STANTONII, n. sp.

This is one of the smallest fossil species known. As stated in the diagnosis, the sporostegia average 0.63^{mm} by 0.48^{mm} . The longest specimen measured was 0.70^{mm} and the shortest 0.60^{mm} . The largest diameter observed was 0.51^{mm} and the smallest 0.45^{mm} . In several instances specimens were found that had been fractured in the middle,

¹Jan (1888), 156, 157, figs 1, 2.

²The Stratigraphic Position of the Bear River Formation. Am. Journ. Sci. n.s. 98-115. Feb. 1892.

thus presenting a perfect cross-section (fig. 3). The central portion, corresponding to the oöspore was filled with nearly white silica, while the portion that was originally the wall of cellulose surrounding the oöspore was bluish in color. The furrows on the fruit (see fig. 1), caused by the five enveloping cells of the sporostegium, are separated by rather prominent ridges, but the walls are not marked with dots or processes as is so frequently the case. The base (fig. 2) showing the origin of the five enveloping cells, presents a small five sided orifice which answers to the point of attachment.

Among the 60 or more species that have been described in a fossil state, there are several that resemble *Chara Stantonii* in general appearance, but when more closely examined it is found that they all differ in size or number of cells exposed in side view, and as these are characters of great constancy it serves clearly to distinguish them. The geological position of this species prove it to be one of the oldest yet described. So far as now known the genus *Chara* had its origin in the Triassic, where it is represented by a single species. The Jurassic has two species, the Cretaceous very few, while the most are found in the upper Tertiary. — F. H. KNOWLTON, *U. S. National Museum, Washington, D. C.*

Is *Cypripedium spectabile* poisonous to the touch?—In the *Torrey Bulletin*, vi, 15 it is stated on the authority of the late Prof. H. H. Babcock of Chicago that after handling *Cypripedium spectabile* or *C. pubescens* he found himself suffering from a severe attack of skin poison. He had taken great pains to keep clear of *Rhus toxicodendron*, but notwithstanding, the same symptoms continued several successive seasons at a time when he was accustomed to handle the *Cypripedium*. The possibility of any effect of this kind was discredited at the time (*Torr. Bull.* vi, 22) nor did it seem credible. Some years later a similar case occurred in this vicinity and was reported to me by the attending physician. A lady near whose home grew a fine clump of *Cypripedium spectabile* had been in the habit of gathering it when in bloom and using it sometimes for home decoration and sometimes for the decoration of the church. At such times for four or five successive seasons she suffered from symptoms of *Rhus* poisoning, but on careful examination no *Rhus* could be found where the *Cypripedium* grew. These symptoms invariably appeared whenever the *Cypripedium* was in the house and disappeared with its removal, and on her removal to another part of the country never re-appeared. In fact, when she ceased collecting the plant she escaped entirely.

A third instance of a similar kind occurred in this part of the country in connection with one of my own students who had always been in the habit of handling *Rhus* with impunity and had done so for years